WSDOT Highway Construction Costs

June 2015

This is a recap of prices bid last quarter and includes a comparison to the previous quarter. It also gives the current year to date bid price for an item. All averages are the weighted average of a set of data. It is intended to provide insight into the cost of an item by showing the range of prices bid. The estimated cost of future projects is dependent on many factors and the unit price selected is determined by an evaluation of past history, future trends and specific details of the project. The average price listed for each item below is not intended to be the bid price used in an estimate.

Roadway Excavation: \$9.76 per cubic yard

The unit bid price decreased by \$0.41 from the average unit price of \$10.17 per cubic yard last quarter. The prices ranged from \$4.50 to \$164.00 per cubic yard. WSDOT awarded 7,495,957 cubic yards of roadway excavation during the second quarter of 2015 and 73,410 cubic yards during the first quarter of 2015. The average unit bid price for 2015 is currently \$9.77 per cubic yard.

Crushed Surfacing: \$17.79 per ton

The unit bid price decreased by \$37.51 from the average unit price of \$55.30 per ton last quarter. This decrease is due to the first quarter only having two contracts which contained crushed surfacing compared with 20 projects in the second quarter. The prices ranged from \$15.00 to \$75.00 per ton. WSDOT awarded 195,430 tons of crushed surfacing during the second quarter of 2015 and 540 tons of crushed surfacing during the first quarter of 2015. The average unit bid price for 2015 is currently \$17.89 per ton.

Hot Mix Asphalt: \$109.61 per ton

The unit bid price increased by \$18.15 from the average unit price of \$91.46 per ton last quarter. The prices ranged from \$50.90 to \$500.00 per ton. WSDOT awarded 268,480 tons of hot mix asphalt during the second quarter of 2015 and 119,384 tons of HMA during the first quarter of 2015. The average unit bid price for western Washington was \$144.81. The average unit bid price for eastern Washington was \$93.33. The 2015 average unit bid price for all of Washington State is currently \$104.02 per ton.

Concrete Pavement: \$176.13

No concrete pavement was awarded during the first quarter of 2015. The average unit bid price for the second quarter 2015 is \$176.13. WSDOT awarded 40,921 cubic yards of concrete pavement during this quarter. The prices ranged from \$175.00 to \$1,080.00 per cubic yard.

Structural Concrete: \$732.52 per cubic yard

The unit bid price decreased by \$17.48 from the average unit price of \$750.00 per cubic yard in the first quarter of 2015. WSDOT awarded 163 cubic yards during the first quarter of 2015 and

6,197 cubic yards of structural concrete in the second quarter of 2015. The current average unit bid price for 2015 \$732.52 per cubic yard.

Steel Reinforcing Bar: \$1.19 per pound

The unit bid price decreased by \$0.66 from the average unit price of \$1.85 per pound in the first quarter of 2015. WSDOT awarded 18,500 pounds of steel reinforcing bar during the first quarter of 2015 and 792,382 pounds of steel reinforcing bar during the second quarter of 2015. The current average unit bid price for 2015 is \$1.21 per pound.

Structural Steel

No structural steel was awarded during the first or second quarters of 2015. The unit bid price during the fourth quarter of 2014 was \$2.49 per pound. During the fourth quarter of 2014, WSDOT awarded 2,648,658 pounds of structural steel. The average unit bid price in 2014 was \$2.52.

WSDOT Unit Bid Prices by Year

		Roadway Excavation		Crushed Surfacing		Hot Mix Asphalt		Portland Cement Concrete Pavement		Structural Concrete		Steel Reinforcing Bar		Structural Steel	
Year	WSDOT CCI	\$/C.Y.	C.Y. Awarded	\$/Ton	Tons Awarded	\$/Ton	Tons Awarded	\$/C.Y.	C.Y. Awarded	\$/C.Y.	C.Y. Awarded	\$/LB	LBs Awarded	\$/LB	LBs Awarded
1990	110	\$2.62	671,535	\$8.58	104,201	\$32.82	100,090	\$55.00	0	\$231.51	1,642	\$0.45	636,173	\$0.82	1,930,000
1991	121	\$4.05	1,808,745	\$9.62	571,159	\$28.62	1,013,919	\$61.53	22,740	\$322.81	10,415	\$0.45	3,510,600	\$1.04	2,186,000
1992	108	\$3.98	2,180,047	\$9.72	736,536	\$26.48	1,327,930	\$46.98	33,269	\$232.04	31,071	\$0.44	6,566,164	\$0.97	5,813,600
1993	106	\$3.24	6,142,080	\$7.65	1,988,632	\$27.23	2,043,134	\$59.97	58,370	\$265.49	40,201	\$0.42	8,054,307	\$0.88	11,848,000
1994	105	\$3.47	2,925,995	\$7.77	1,396,251	\$27.83	1,312,217	\$65.29	95,415	\$248.94	53,120	\$0.41	13,914,531	\$0.71	5,041,000
1995	124	\$4.46	2,551,036	\$9.28	1,079,113	\$28.28	1,282,315	\$100.83	16,508	\$285.02	28,026	\$0.44	5,601,982	\$1.34	1,378,000
1996	124	\$3.92	2,465,355	\$9.64	691,247	\$28.07	1,567,581	\$126.60	0	\$305.22	36,859	\$0.49	7,598,737	\$1.17	2,458,000
1997	139	\$4.92	1,406,484	\$10.30	631,209	\$31.35	1,631,318	\$152.37	747	\$313.29	6,963	\$0.51	1,380,557	\$1.37	1,352,000
1998	116	\$2.89	2,012,067	\$10.88	381,219	\$31.10	777,066	\$33.16	25,768	\$277.25	27,217	\$0.49	3,894,321	\$1.03	11,044,000
1999	120	\$3.79	3,340,657	\$11.21	771,540	\$28.54	2,244,177	\$36.43	104,901	\$323.92	31,775	\$0.45	4,796,081	\$1.12	1,444,000
2000	128	\$3.98	1,243,116	\$11.57	326,081	\$31.69	1,362,950	\$103.02	50,543	\$279.99	20,320	\$0.51	2,544,716	\$1.15	0
2001	129	\$2.81	5,030,996	\$11.08	704,391	\$32.01	1,938,378	\$117.65	24,233	\$359.38	24,836	\$0.41	7,973,186	\$1.17	9,170,000
2002	139	\$5.53	809,083	\$10.45	333,687	\$33.51	1,204,308	\$106.89	13,872	\$326.47	8,999	\$0.54	1,485,535	\$0.94	5,842,000
2003	145	\$5.39	1,924,839	\$10.26	739,709	\$34.78	1,823,518	\$87.75	132,901	\$380.84	47,445	\$0.50	7,536,245	\$1.13	5,478,400
2004	170	\$7.23	1,719,277	\$12.78	486,830	\$40.59	1,284,000	\$132.02	18,714	\$328.12	15,141	\$0.86	1,979,940	\$1.31	145,600
2005	176	\$5.61	4,155,185	\$12.82	663,167	\$42.64	1,558,151	\$118.36	108,956	\$419.25	38,012	\$0.91	5,105,718	\$1.50	4,300,380
2006	228	\$6.10	2,235,753	\$12.49	448,026	\$57.12	1,050,210	\$279.28	7,612	\$475.88	14,737	\$0.98	5,208,579	\$2.67	236,000
2007	230	\$6.31	1,717,938	\$15.15	737,708	\$61.36	1,212,649	\$140.65	66,559	\$567.75	20,553	\$1.15	5,313,761	\$1.70	1,800,000
2008	241	\$8.85	5,354,342	\$13.61	1,158,940	\$66.08	1,309,501	\$206.33	38,370	\$497.33	39,501	\$1.11	6,683,180	\$2.73	6,976,400
2009	223	\$6.69	909,988	\$14.61	599,499	\$67.44	1,273,739	\$133.62	43,001	\$460.54	20,688	\$0.69	2,285,755	\$1.41	3,625,000
2010	232	\$7.25	2,310,707	\$12.75	891,964	\$63.44	1,113,530	\$142.75	123,564	\$572.21	43,248	\$0.92	8,701,715	\$1.58	6,761,500
2011	245	\$9.25	1,912,622	\$15.73	695,521	\$66.17	876,762	\$168.20	47,726	\$489.26	42,534	\$0.87	7,859,554	\$1.90	5,757,309
2012	258	\$7.45	1,190,845	\$15.73	279,475	\$80.15	429,922	\$174.21	7,682	\$492.72	19,892	\$0.92	2,964,656	\$1.50	1,100,000
2013	243	\$5.42	849,757	\$15.09	228,195	\$71.34	725,570	\$304.91	637	\$493.10	9,703	\$0.96	1,842,253	\$1.50	0
2014	328	\$18.16	859,575	\$19.02	408,603	\$78.51	635,510	\$183.62	55,666	\$623.25	37,751	\$1.01	6,492,142	\$2.52	2,882,558
2015 YTD	319	\$9.77	774,977	\$17.89	195,970	\$104.02	387,864	\$175.77	40,921	\$732.97	6,360	\$1.21	810,882	\$0.00	0

WSDOT Data through June 2015

The quantities shown in this table represent only quantities of the standard items used to calulate the Construction Cost Index and are not intended to represent the overall quantities of items awarded yearly by WSDOT Unit bid prices for years when an item was not awarded were calculated by averaging the unit bid price of the year before and the year after

Note: WSDOT 2003 and 2004 CCI data points adjusted to correct for spiking bid prices on structural steel



WSDOT Unit Bid Prices by Year

	WSDOT	Roadway Excavation		Crushed Surfacing		Hot Mix Asphalt		Portland Cement Concrete Pavement		Structural Concrete		Steel Reinforcing Bar		Structural Steel	
Year	CCI	\$/C.Y.	C.Y. Awarded	\$/Ton	Tons Awarded	\$/Ton	Tons Awarded	\$/C.Y.	C.Y. Awarded	\$/C.Y.	C.Y. Awarded	\$/LB	LBs Awarded	\$/LB	LBs Awarded
1990	110	\$2.62	671,535	\$8.58	104,201	\$32.82	100,090	\$55.00	0	\$231.51	1,642	\$0.45	636,173	\$0.82	1,930,000
1991	121	\$4.05	1,808,745	\$9.62	571,159	\$28.62	1,013,919	\$61.53	22,740	\$322.81	10,415	\$0.45	3,510,600	\$1.04	2,186,000
1992	108	\$3.98	2,180,047	\$9.72	736,536	\$26.48	1,327,930	\$46.98	33,269	\$232.04	31,071	\$0.44	6,566,164	\$0.97	5,813,600
1993	106	\$3.24	6,142,080	\$7.65	1,988,632	\$27.23	2,043,134	\$59.97	58,370	\$265.49	40,201	\$0.42	8,054,307	\$0.88	11,848,000
1994	105	\$3.47	2,925,995	\$7.77	1,396,251	\$27.83	1,312,217	\$65.29	95,415	\$248.94	53,120	\$0.41	13,914,531	\$0.71	5,041,000
1995	124	\$4.46	2,551,036	\$9.28	1,079,113	\$28.28	1,282,315	\$100.83	16,508	\$285.02	28,026	\$0.44	5,601,982	\$1.34	1,378,000
1996	124	\$3.92	2,465,355	\$9.64	691,247	\$28.07	1,567,581	\$126.60	0	\$305.22	36,859	\$0.49	7,598,737	\$1.17	2,458,000
1997	139	\$4.92	1,406,484	\$10.30	631,209	\$31.35	1,631,318	\$152.37	747	\$313.29	6,963	\$0.51	1,380,557	\$1.37	1,352,000
1998	116	\$2.89	2,012,067	\$10.88	381,219	\$31.10	777,066	\$33.16	25,768	\$277.25	27,217	\$0.49	3,894,321	\$1.03	11,044,000
1999	120	\$3.79	3,340,657	\$11.21	771,540	\$28.54	2,244,177	\$36.43	104,901	\$323.92	31,775	\$0.45	4,796,081	\$1.12	1,444,000
2000	128	\$3.98	1,243,116	\$11.57	326,081	\$31.69	1,362,950	\$103.02	50,543	\$279.99	20,320	\$0.51	2,544,716	\$1.15	0
2001	129	\$2.81	5,030,996	\$11.08	704,391	\$32.01	1,938,378	\$117.65	24,233	\$359.38	24,836	\$0.41	7,973,186	\$1.17	9,170,000
2002	139	\$5.53	809,083	\$10.45	333,687	\$33.51	1,204,308	\$106.89	13,872	\$326.47	8,999	\$0.54	1,485,535	\$0.94	5,842,000
2003	145	\$5.39	1,924,839	\$10.26	739,709	\$34.78	1,823,518	\$87.75	132,901	\$380.84	47,445	\$0.50	7,536,245	\$1.13	5,478,400
2004	170	\$7.23	1,719,277	\$12.78	486,830	\$40.59	1,284,000	\$132.02	18,714	\$328.12	15,141	\$0.86	1,979,940	\$1.31	145,600
2005	176	\$5.61	4,155,185	\$12.82	663,167	\$42.64	1,558,151	\$118.36	108,956	\$419.25	38,012	\$0.91	5,105,718	\$1.50	4,300,380
2006	228	\$6.10	2,235,753	\$12.49	448,026	\$57.12	1,050,210	\$279.28	7,612	\$475.88	14,737	\$0.98	5,208,579	\$2.67	236,000
2007	230	\$6.31	1,717,938	\$15.15	737,708	\$61.36	1,212,649	\$140.65	66,559	\$567.75	20,553	\$1.15	5,313,761	\$1.70	1,800,000
2008	241	\$8.85	5,354,342	\$13.61	1,158,940	\$66.08	1,309,501	\$206.33	38,370	\$497.33	39,501	\$1.11	6,683,180	\$2.73	6,976,400
2009	223	\$6.69	909,988	\$14.61	599,499	\$67.44	1,273,739	\$133.62	43,001	\$460.54	20,688	\$0.69	2,285,755	\$1.41	3,625,000
2010	232	\$7.25	2,310,707	\$12.75	891,964	\$63.44	1,113,530	\$142.75	123,564	\$572.21	43,248	\$0.92	8,701,715	\$1.58	6,761,500
2011	245	\$9.25	1,912,622	\$15.73	695,521	\$66.17	876,762	\$168.20	47,726	\$489.26	42,534	\$0.87	7,859,554	\$1.90	5,757,309
2012	258	\$7.45	1,190,845	\$15.73	279,475	\$80.15	429,922	\$174.21	7,682	\$492.72	19,892	\$0.92	2,964,656	\$1.50	1,100,000
2013	243	\$5.42	849,757	\$15.09	228,195	\$71.34	725,570	\$304.91	637	\$493.10	9,703	\$0.96	1,842,253	\$1.50	0
2014 2015	328	\$18.16	859,575	\$19.02	408,603	\$78.51	635,510	\$183.62	55,666	\$623.25	37,751	\$1.01	6,492,142	\$2.52	2,882,558
YTD	321	\$9.95 entember 2015	783,243	\$18.35	203,996	\$104.51	410,931	\$175.77	40,921	\$732.97	6,360	\$1.21	810,882	\$1.50	0

WSDOT Data through September 2015

The quantities shown in this table represent only quantities of the standard items used to calulate the Construction Cost Index and are not intended to represent the overall quantities of items awarded yearly by WSDOT Unit bid prices for years when an item was not awarded were calculated by averaging the unit bid price of the year before and the year after

Note: WSDOT 2003 and 2004 CCI data points adjusted to correct for spiking bid prices on structural steel

